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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/821,075	04/08/2004	William Myers JR.	584-35897US (102.72)	9206
41904	7590	05/03/2006	EXAMINER	
KEITH R. DERRINGTON SIMMONS & DERRINGTON, L.L.P FROST BANK BUILDING 6750 WEST LOOP SOUTH, SUITE 920 BELLAIRE, TX 77401			RADI, JOHN A	
			ART UNIT	PAPER NUMBER
			3641	

DATE MAILED: 05/03/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

<b>Office Action Summary</b>	<b>Application No.</b> 10/821,075	<b>Applicant(s)</b> MYERS ET AL.	
	<b>Examiner</b> John A. Radi	<b>Art Unit</b> 3641	

**-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --**

**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 03 March 2006.
- 2a) ☐ This action is **FINAL**.                      2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 4 and 7-15 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 4 and 7-15 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).  
a) ☐ All    b) ☐ Some \* c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
  2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- \* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- |  |   |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892)  | 4) <input type="checkbox"/> Interview Summary (PTO-413)<br>Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)                                   | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152)             |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)<br>Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____  |

## **DETAILED ACTION**

### ***Allowable Subject Matter***

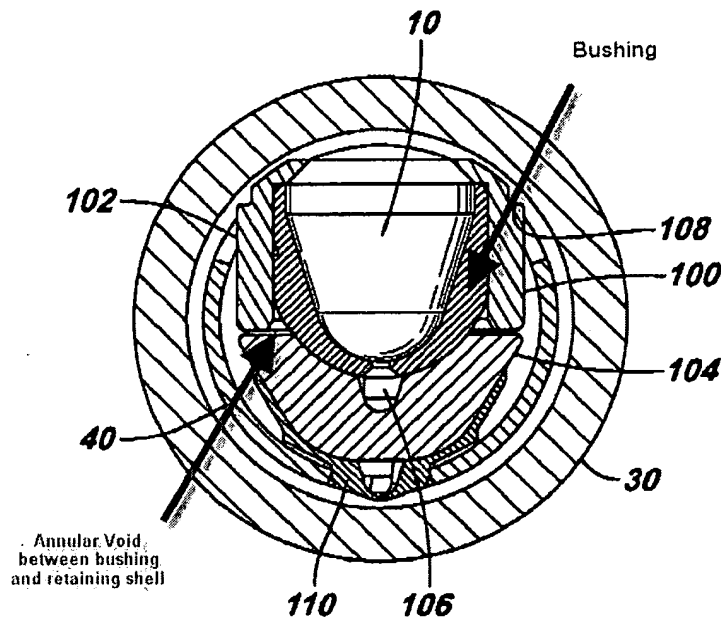
The indicated allowability of claims 7, 9 14 and 15 is withdrawn in view of the newly discovered reference(s) to Li et al (US 20050173118). Rejections based on the newly cited reference(s) follow.

### ***Claim Rejections - 35 USC § 102***

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

Claims 4 and 7-15 are rejected under 35 U.S.C. 102(e) as being anticipated by Li et al (US 20050173118).

Li teaches a shaped charge assembly (10) comprising: a casing having an open end and closed end (10) walls extending away from closed end (fig 1), and a reinforcing system circumscribing at least a portion of casing (fig 4a). Said reinforcing system comprising a retaining shell coaxially circumscribing casing (102) and a bushing coaxially disposed between casing and shell (see diagram excerpted below).

**FIG 4A**

With respect to claim 4, Li teaches a spine with an annular void (30).

With respect to claim 8, wherein the walls of shaped charge have walls decreasing in thickness away from closed end (figure 1)

With respect to claim 9, wherein the thickness of bushing (4A above) is variable to accommodate varied orientations of said casing (10 and 12).

With respect to claims 10 and 11, the assembly further comprising at least one other shaped charge assembly (figure 3, and para 32).

With respect to claim 12, wherein the reinforcing system produces an asymmetric radial weight distribution around the axis of the gun body (figure 4A, shows a non symmetrical weight distribution around the radius of the gun body, and because the

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apparatus is designed for use in a wellbore, it can be said to orient the gun body within the wellbore).

With respect to claim 13, edges of closed end of the shaped charge (10) are curvilinear (figure 4A).

With respect to claim 14, wherein an annular void is disposed between retaining shell and said bushing (see 4A above, and 6A for more pronounced annular void).

With respect to claim 15, explosive (16) located within shaped casing (12), wherein the annular void circumscribes casing (4A and 6A).

### ***Response to Arguments***

Applicant's arguments with respect to claims 4 and 7-15 have been considered but are moot in view of the new ground(s) of rejection.

### ***Conclusion***

Any inquiry concerning this communication or earlier communications from the examiner should be directed to John A. Radi whose telephone number is 571-272-5883. The examiner can normally be reached on M-F 8-5.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Michael J. Carone can be reached on 571-272-6873. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

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Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

John A. Radi  
Patent Examiner  
Art Unit 3641



*for* Michael J. Carone  
Supervisory Patent Examiner  
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